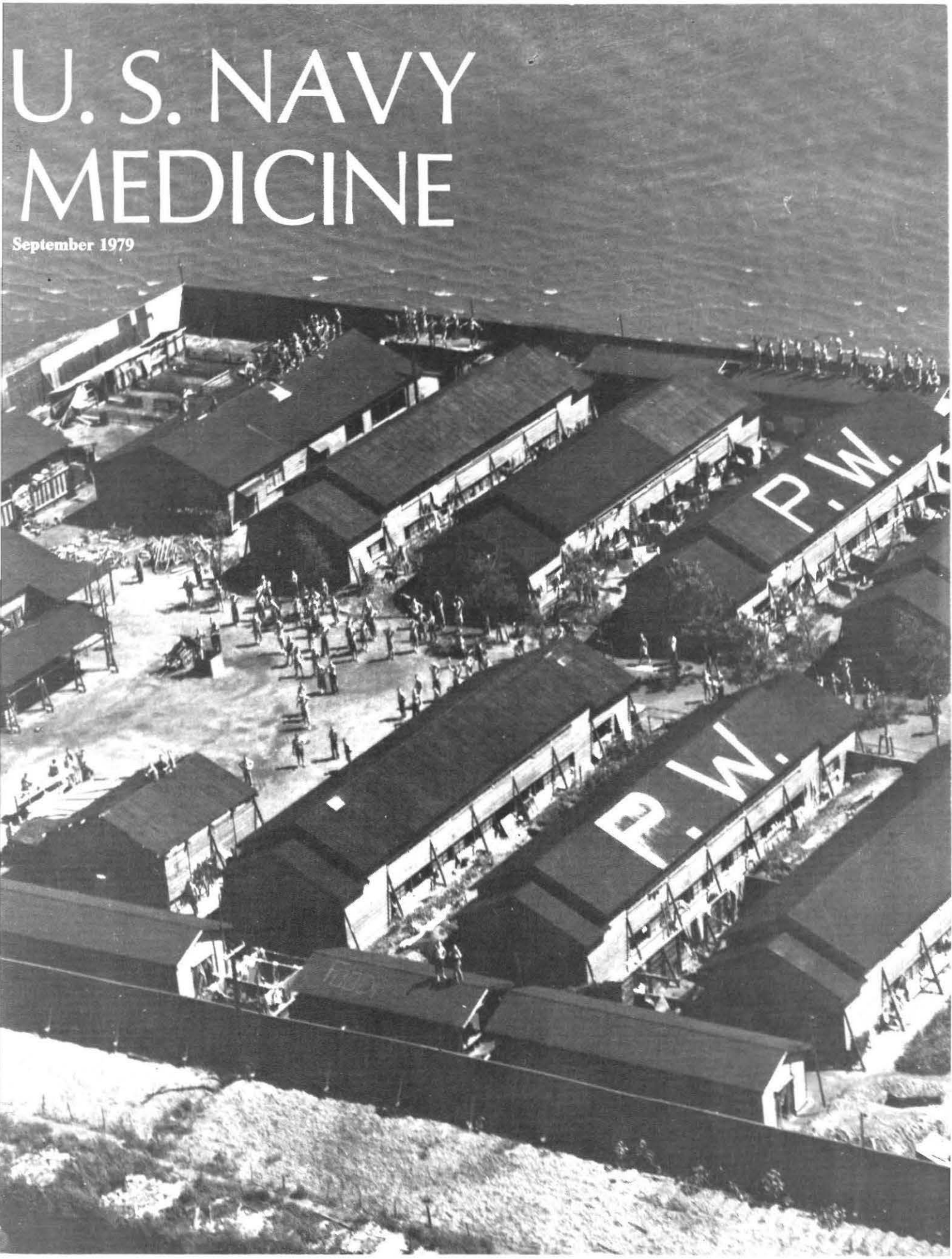
U.S. NAVY MEDICINE

September 1979



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U.S. NAVY MEDICINE

Vol. 70, No. 9
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COVER: Happy inmates of a POW camp in the Yokohama area wave to a plane from the USS *Shangra-La.* This scene was reenacted all over Japan as WWII ended. Chief Pharmacist's Mate Adolph Wessel Meyers spent four years in camps such as this before he was liberated in September 1945. —National Archives

Story on page 12.

Navy Committed to Quality Health Care

The following is an excerpt from a recent statement by VADM Willard P. Arentzen, MC, USN, Surgeon General of the Navy, before the Defense Subcommittee of the House Appropriations Committee on Navy medical activities. Another excerpt from that statement will appear in the next issue of U.S. Navy Medicine.

The primary peacetime mission of the Navy Medical Department is readiness for war. Accomplishing this mission depends upon maintaining a mobilization base of highly trained and experienced active duty and reserve personnel, providing medical support to active duty personnel to insure the health readiness of the Navy and Marine Corps team and planning for immediate expansion of medical support to meet wartime demands.

The number of Medical Department personnel required to meet projected wartime needs exceeds the requirement for peacetime support of the relatively young and healthy active duty force. During peacetime, these medical assets are used to support the secondary peacetime mission of the Medical Department, the provision of a health care benefit to the families of active duty personnel, and to retired personnel and their dependents. In turn, dependents and retired personnel provide the broad spectrum of patients necessary to maintain essential skill levels of medical personnel.

The delivery of health care and the maintenance of a highly skilled and responsive Medical Department force are dependent upon providing adequate operational funds, recruiting and retaining qualified personnel, and providing adequate facilities, equipment, and ancillary support.

Health Care Environment

Health care benefits continue to be a foremost consideration among active duty personnel when making career decisions. This has been reflected by the intensity with which all beneficiaries have voiced their disappointment over the gradual erosion of direct health care availability. Publications directed toward military personnel as well as public media amplify the concern which exists over a multitude of factors that have directly and indirectly impacted on the quantity of care available. Although this type of concern is frequently brought to my attention, I continue to resist implications suggestive of any possible future compromise in the quality of care provided. The Navy Medical Department is committed to maintaining the highest level of health care at all medical facilities.

The total support of high quality total health care assumes a variety of mutually supportive factors, and the interdependence of each of these similarly affects the magnitude of the health care services provided.

Physician Recruiting and Retention

Physician recruiting and retention have been a matter of concern, to the Navy, the Department of Defense, and to the Congress, for several years. The Armed Forces Health Professions Scholarship Program established by Congress in anticipation of the requirements of the All-Volunteer Force is the primary source of input to the Medical Corps. It currently authorizes 1,575 positions of which 96 percent are designated for medical students. These students incur an active duty obligation to the Navy.

Our ability to attract qualified medical students with this program is dependent on the Armed Forces Health Professions Scholarship Program being competitive with the National Health Service Corps Scholarship Program. At the present time, the Armed Forces Health Professions Scholarship Program is not fully competitive. This was reinforced by a declination rate of 27 percent during FY 78.

Dental student inputs into this program ceased in FY 78 and the available spaces have been reprogrammed to increase medical student inputs to reduce the medical officer shortage. In the future, direct recruitment will be the main source available for acquiring dental officers. The Navy Recruiting Command is currently providing adequate numbers of dental candidates.

In order to fortify this method of acquisition, we are working very closely with Navy Recruiting Command, in anticipation of the dependence on direct dental recruiting after the last scholarship candidates graduate in 1981. There is some skepticism about the ability to recruit the number of dental officers necessary after the last of the scholarship students graduate. However, because of the limited recruiting effort in the past, it is not clear at this time if total recruiting can be successful.

(To be continued)

EMT Program at Whidbey Island

Seattle, Wash., has been labeled with many adjectives—"Gateway to Alaska," "Most Livable City in the United States," and "The Best Place to Have a Heart Attack," among others. This last designation reflects Seattle's singularity in having been the first city in the United States to establish a "Medic One" program (the paramedics of Seattle) as well as "Medic Two" (a community-sponsored program) aimed at instructing the general populace in CPR (Cardiopulmonary Resuscitation). One-third of the citizens living in Seattle have been trained through this program.

Sixty miles to the northwest of Seattle on an island in the Strait of Juan De Fuca, lies Naval Hospital, Whidbey Island. This facility, like neighboring Seattle, also holds a proud and singular distinction—that of being the first naval medical activity in the Thirteenth Naval District to organize and implement its own ongoing Emergency Medical Technician Training Program.

Due to the isolated location of the naval medical facility and the large number of personnel it supports, the command determined that the already intensive training received by hospital corpsmen should be augmented. With this in mind, the naval hospital established and implemented the first of ten 82-hour courses for the training of Emergency Medical Technicians in August 1974.

The Emergency Medical Technician (EMT) is the first link in the chain of emergency medical services. The EMT is usually the first paraprofessional on the scene of an injury or illness. To perform this responsibility properly, the EMT must be trained and indoctrinated in the many and varied aspects of field emergency medicine.

EMT team evacuates a patient via search and air rescue helicopter.

Standards for the course are established by the U.S. Department of Transportation, with certification granted under the auspices of the Washington State Department of Social and Health Services. Each student receives intensive training and indoctrination in the highly technical area of cardiopulmonary resuscitation, medical emergencies,

EMTs monitor patient's heartbeat.
U.S. Navy Medicine

environmental injuries, emergency childbirth, trauma, operation of emergency vehicles and equipment, patient handling and extrication, and the medicolegal aspects of emergency medicine.

In its infancy, the EMT program was staffed by personnel of the naval hospital with a medical officer serving as the physician coordinator, and hospital corpsmen already certified as Washington State Emergency Medical Technicians fulfilling responsibilities of lay instructors.

The courses were originally conducted within the naval hospital facilities and are presently held at Skagit Valley College which grants five hours of college credits in the field of Nursing upon completion of the program. Medical Department personnel continue their involvement as physician coordinators and lay instructors.

Presently, all hospital corpsmen assigned to the emergency room and the search and rescue crew are certified by the State of Washington as Emergency Medical Technicians. Additionally, several graduates of the EMT program are currently assigned to the Operating Forces afloat. One alumnus was instrumental in implementing an EMT syllabus on board the USS *Enterprise.*

All hospital personnel, regardless of their speciality, are eligible to participate in this training provided they meet the prerequisites for enrollment established by the Washington State Department of Social and Health Services.

Since its inception, the program has graduated a total of 81 hospital corpsmen and 14 auxiliary personnel from the station security force and fire department.

There are currently 24 Washington State certified EMTs assigned to Naval Hospital, Whidbey Island with 21 prospective EMTs enrolled in the summer session.

The implementation of this program has proven to be of benefit not only to the individual but to the command, local community, and the Navy Medical Department. Above all, the primary beneficiaries are the sick and injured who rely upon the professional services of the Emergency Medical Technicians.

—Story by HM1 W.F. Ebarb, USN and HM2 R.K. Prendergast, USNR-R. Photographs by PH3 L.A. Vendetti, USN

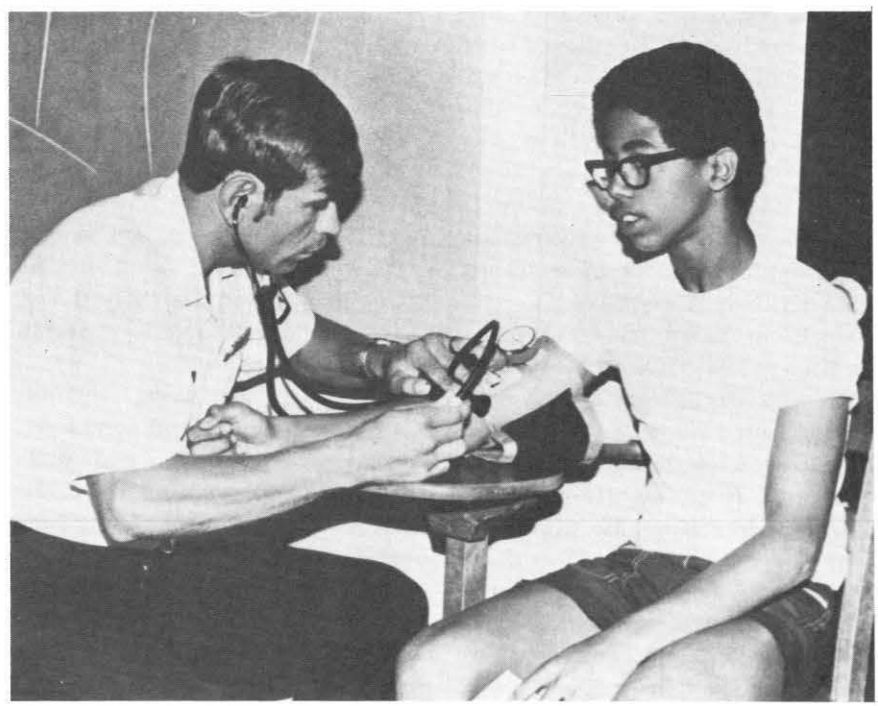
Navy Volunteers Take Up the Slack

Twenty-two volunteer doctors, hospital corpsmen, nurses, and Medical Service Corps officers from NRMC Orlando, recently traveled to Daytona Beach, Fla., where they performed physicals on 205 disadvantaged youths.

The NRMC's Family Services Department, headed by CAPT Victor Romano, worked in conjunction with Bethune-Cookman College of Daytona Beach in setting up the second annual physical program by NRMC Orlando.

In the past, physicals were conducted by the Air Force until cutbacks forced them to disband the program. Under the auspices of Dr. Romano, NRMC Orlando picked up the ball and the program was kept alive.

Youths receiving the physicals entered the National Youth Sports Program sponsored by the Department of Health, Education and Welfare. Physicals were needed before the youths could participate in the sports program.



HM3 Larry Brown checks the blood pressure on a budding athlete.

Fort Lupton Navyman: From Mechanics to Medicine

After four years in the Air Force fixing planes, Jerry Holcomb is now fixing people aboard the Seventh Fleet guided missile cruiser, USS *Horne.*

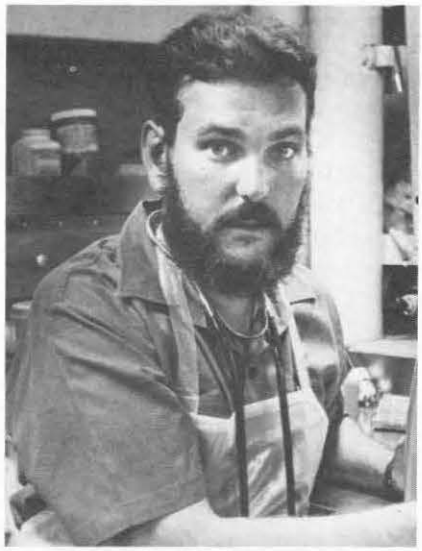
"I enjoyed my four years as an airman and I learned a good trade," says HM2 Jerry R. Holcomb, "but I wanted to work in the field of medicine, not jet mechanics."

Today, the Fort Lupton, Colo., native is assigned to the two-man Medical Department aboard the USS *Horne,* currently deployed with the Seventh Fleet in the Western Pacific. Here he tends to the medical needs of more than 450 men.

"Someday I'll become a doctor," said the 25-year-old corpsman. "I've wanted to work in medicine since my high school days."

Upon graduation from Fort Lupton High in 1972, Holcomb got a job as an X-ray technician orderly and later attended Aims Junior College in Greeley, Colo., while majoring in radiology. Here he realized the medical field was his lifelong ambition.

"When I enlisted in the Air Force I tried to get into the medical field but ended up playing nursemaid to B-52 bombers," he said. "It was quite a let down. But I kept telling myself to keep studying; if I wanted it badly enought I'd get it. That's what I'm doing in the Navy. I was guaranteed the hospital corpsman rating."



HM2 Jerry R. Holcomb

Sick call, lab work, reports, records verification and screening, sanitation inspections, and daily water sampling are but a few of the "Doc's" responsibilities aboard the *Horne.*

"It's a demanding job, but I love it. The men rely on me. When they come to my office they come for a good reason. I find it difficult to tell a patient to come back during sick call hours, even if I'm up to my neck in paperwork. Removing a cyst or a toenail, or stitching people up are common occurrences. I like to help others, to contribute to their well-being."

The former airman tries to put himself in a patient's position. "I feel for someone who's ill. I try to examine my patients for all possible symptoms and make them feel comfortable. It makes for a better relationship and that's important to me."

Prior to assuming his medical duties on the *Horne,* Holcomb attended 10 weeks of technical medical training at the Navy's Balboa Hospital in San Diego. He then requested pharmacy school, but after nearly three months of a six-month course, and while maintaining a 97 grade point average, he withdrew.

"The course was outstanding," he said, "but I realized it wasn't what I wanted to do. I'd rather work with patients on a one-to-one basis. So I was assigned to the pediatric ward at Balboa for a year."

There is no doctor on board the *Horne.* When an emergency arises, Holcomb and his co-worker diagnose and treat the patient until he can be evacuated to the nearest hospital.

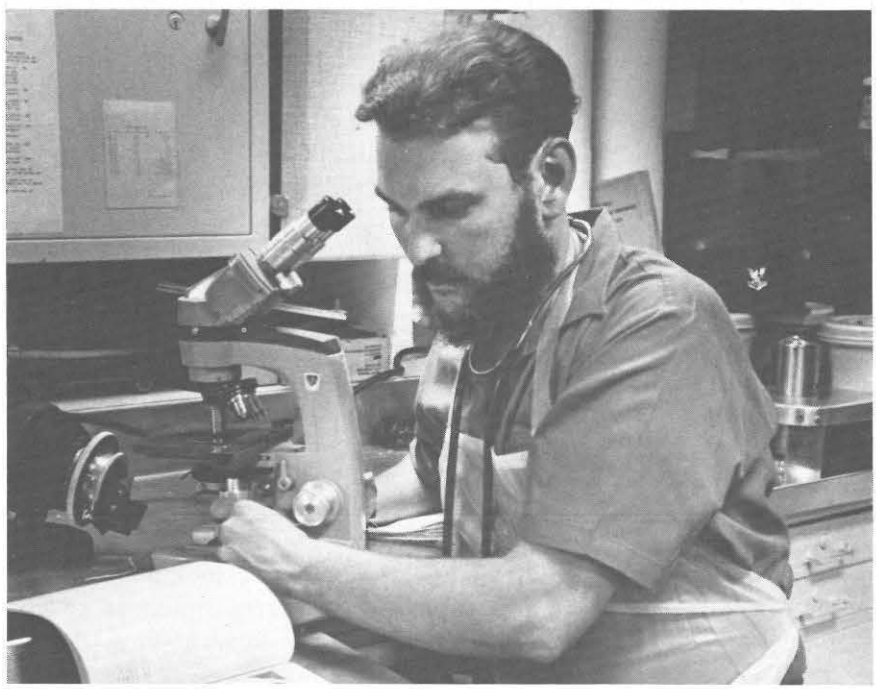
USS Horne in the Western Pacific

The highlight of the Navy veteran's two-year career was a four-month South Pacific cruise. "The Navy has taken me places that most people only dream of—Tahiti, New Zealand, Australia, Fiji, American Samoa, and Raratonga. They're all interesting places, but New Zealand tops them all. It's so beautiful. People's lives seem so uncomplicated. They are fun-loving and carefree. The whole experience was great and it was like opening a passage between the U.S. and South Pacific."

In addition, Holcomb has visited Hong Kong, Thailand, Japan, and the Philippines.

"Join the Navy and see the world is definitely a fact," he said.

—Story and photos by PH/JO Ken A. George, USN.



HM2 Holcomb consults a book on microbiology while reading a slide.

The Dental Assistant, Class A School

The Dental Assistant, Basic, Class A School, along with the other dental technician schools, recently celebrated the first anniversary in new facilities located at the Naval School of Dental Assisting and Technology, San Diego, Calif. The curriculum, as with all curricula at the school, has been converted from a subject-based, lecture/demonstration course of instruction. The task-based curriculum consists of 17 educational modules containing individual study guide/workbooks which are complimented by over 70 locally prepared videocassettes. Each task is performance tested by a staff facilitator. The program with the exception of selected modules, is individualized to the point where trainees can essentially proceed through the course at their own pace. The use of locally prepared videocassettes allows students to repeatedly view demonstration and instructional tapes, thereby enabling facilitators to devote more time to individual student assistance.

Due to a shortage of dental technicians, the school is temporarily operating on a 10-week instead of the normal 12-week curriculum, during which each student is expected to complete a 245-item task list.* Primary emphasis is placed on charting, assisting the dental officer in providing treatment, preventive dentistry, and dental radiology. After sufficient practice on a simulated patient, each student completes a clinical prophylaxis and takes one complete set of radiographs on a classmate. Upon graduation, trainees are assigned to dental facilities ashore, afloat, and with the Fleet Marine Force.

Dental recruit being tested on oral prophylaxis procedures

Classes are convened at 3-week intervals and four classes run concurrently. The maximum student capacity for each class is 50. The staff presently consists of 29 facilitators and teaching assistants. The average facilitator/student ratio is 1:7, affording maximum opportunity for individualized instruction.

Personnel desiring more information concerning admission requirements and application procedures should contact their Educational Services Office or Career Counselor.

Dental recruit practices film placement procedures for taking intraoral radiographs.

*The 12-week schedule will resume 9 Oct 79

On Growing Children

Bedwetting: Its Origins and its Cure

CDR Eli Breger, MC, USNR

A new series, On Growing Children, begins this month in U.S. Navy Medicine. The articles are directed toward those Navy health care professionals working with children and their families.

"Train up a child in the way he should go and when he is old he will not depart from it." Proverbs 12.6

Bedwetting is one of the most commonly seen problems of developing children. However, its origins remain poorly understood. Enuresis is the medical term for a child wetting his bed or clothing beyond the age of expected control. It is present in about one of five children upon their starting school and this percentage decreases with each additional year of age. However, even at the age of approaching adolescence a small but significant number of children continue with this symptom.

Although the problem appears similar in virtually every child it is not a singular condition in its origin. In a given child bedwetting is due to several factors coming together and bringing about the symptom. Furthermore, as the child passes from one stage of development to another the original meaning of the symptom may be layered over by newer ones and become more complex.

Most parents believe their bedwetting children cannot help themselves and therefore need understanding. This concept is basically true but it is far from easy to hold when each morning the parent finds the bed wet and has to change the linen. Mother is likely to see her child as inadequate and her own parenting role as a failure. From my own clinical experience I conclude that parents' attempts at coping are more rewarding when they understand the diverse roots of the condition and the specific workings in their own child. In this essay I attempt to integrate what is generally known or theorized regarding the origins of enuresis. Hopefully, this will help parents to more precisely understand the problem in their own children. Suggestions for amelioration will than be discussed.

Physical Factors

Considerable attention has been focused on the role of physical factors. Many studies have been done using techniques to observe the urinary system. In a small number of bedwetting children, not exceeding five percent, signs of disease or birth abnormalities have been discovered. These exceptional cases can be diagnosed by the physician through a careful history, physical examination, and appropriate laboratory procedures. Frequent and painful urination or a dribbling flow upon emptying the bladder suggests a physical problem.

Hereditary Considerations

A hereditary basis for this condition has been suggested based on findings describing histories of bedwetting in parents and siblings of the bedwetting child as being significantly higher in number than in the general population. One view conceives bedwetting as reflecting an "irritable bladder" which is the result of an inherited sensitivity of the bladder musculature causing it to contract and empty even at normal urine pressures. Indeed one commonly sees children who urinate frequently and seek the bathroom urgently. Another notion holds that bedwetting children, by heredity, have a poorly developed ability to coordinate the complex bladder muscle groups which go into tightening up and holding back or relaxing and voiding. However, the studies have never been conclusive. Even those who view the condition as hereditary concede that only a potential for bedwetting may be genetically

CDR Breger is Chief of the Psychiatry Service at the Naval Hospital Beaufort, S.C. 29902. Copyright 1979 Eli Breger, M.D. All rights reserved. May be reprinted or reproduced within the Navy for nonprofit type educational purposes in keeping with the fair use doctrine.

transmitted. This becomes symptomatic only under specific environmental or psychologic conditions.

Psychologic Roots

Presently, opinion has shifted to regard bedwetting as a psychological manifestation sometimes added on to physical and hereditary inclinations. The psychological roots of the problem are several.

The role of inadequate basic toilet training is primary. The child's problem is viewed as a developmental problem in learning. That is, the child has never learned how to control the urge to urinate. There are parents who train in a premature, excessive, or punitive manner. In vulnerable children this leads to a fixation of wetting and represents a retaliatory and negativistic response. These children are frequently passive and submissive. They have great difficulty in expressing anger and displaying aggression but express these oppositional feelings through bedwetting.

There are mothers who share a deep sympathy with their child's bedwetting because of unsolved conflicts in their own early training. They are unable to help the child develop the necessary attitudes of shame and unacceptability which enable him or her to assume responsibility for control these parents tend to infantalize and indulge their offspring thereby depriving them of growth fostering stimulation so vital for learning. Without conscious awareness they relive their own childhood experiences through their children's training. Such children are characterized by immaturity in their overall development. When they speak their minds they say, "How could anyone expect me to control my bedwetting when I am so young, so small, and so deeply asleep?" Some children may say, "If I do what is asked of me and become dry, what will be asked of me next by way of grownup behavior? No, that's not for me."

My own clinical work leads me to conclude that the largest percentage of cases is related to inadequacies in toilet training.

There are some children who persist at this infantile developmental level because there is something pleasurable in "letting go," feeling the decrease in bladder pressure and the warm sensation of urine flowing along their thighs. All children probably feel this way early on but the bladder normally comes under control, on a psychological level, in response to shame and training. For some bedwetting children this sensation has such heightened intensity that the process becomes protracted and learning does not take place.

In the minds of some children unable to master the process of urinary control, bedwetting is perceived as a defect or imperfection. This is especially so when real imperfections exist such as with a physical handicap, intellectual inadequacy, or an underdeveloped penis. As the bedwetting continues the child's perception of having a physical defect intensifies and further hinders the mastery of control.

Enuresis commonly appears in previously trained children who are suddenly placed in acute and stressful situations. There is a developmental retreat to an earlier and more satisfying period when control was not necessary and life simpler. The stress may be realistic and external such as loss of a parent, birth of a sibling, serious illness, surgical procedure, or perhaps worrisome parental discord. The stress may be internal relating to conflicts with which all children struggle at each phase of development. By means of bedwetting the child circumvents the anxiety provoking problem and as a result shows less obvious tension.

It would appear that bedwetting has a different psychologic basic in different children. The meaning can change and operate on several layers with increasing age. Constitutional factors may play a role in this multiply determined problem. Once bedwetting is established other emotional difficulties and personality changes are bound to follow. It is even quite possible for the symptom's original cause to become extinct and for it to continue as an isolated and learned response.

Advice for Management

How can parents help their bedwetting children? As in all of life an ounce of prevention is worth a pound of cure. Nighttime toilet training should be undertaken toward the end of the second year of life when the child shows signs of readiness such as occasional dry nights. The essence of successful training rests in the appropriate and clear communication of the message that control is desirable, the child has it within him to attain this but that it will require working on. The mother's role then becomes supportive, diligent, and insistent. She must avoid the pitfalls of harshness and punishment on the one hand and haphazard indulgence on the other. Talk about it, ask the child to try, suggest that he has it within him to succeed, praise successes and express disappointment with failures. Always hold out a positive and hopeful expectation for the next night.

To stop bedwetting in the older or regressed child, training as discussed above is primary. Most children want to be dry but have given up hope. Attempt to rekindle that expectation. Once his desire to be dry is genuinely expressed spend some time with him each night at bedtime urging him to think about the problem and encouraging him to try hard. The concept of

putting a small active part of his mind on duty through the night as a "sentry" to stand guard over his bladder has proven helpful. When the bladder fills up the "sentry" will alert him to get up and void or urge him to tighten up and continue to sleep. Praise successes and when he fails hold out hope that tomorrow night will be better. Have him keep a calendar record of his progress to strengthen this "suggestive-supportive" approach.

This program should be maintained over many weeks to judge its effectiveness. If there is no positive response, discontinue and suggest to him he may be more ready to succeed several months hence. Try again at that time. With positive reponse continue the process for several months to consolidate gains and make them permanent.

Limiting reasonable amounts of fluid in the evening has been traditional but not effective. However, insisting that the child void before getting into bed makes for good training. Additionally, having him void before the parents retire is useful only if he can be successfully awakened.

There are older bedwetting children who wear diapers at night because of parents' insistence or their own desire. This is unadvisable. It clearly communicates to the child the inappropriate message that he is expected to wet. It would be far better for him to be responsible for changing his bed linen in the morning. This is a realistic way to deal with the result of his problem. Hopefully it will enhance the development of motivation to stop wetting.

There are several medications which may help a child in his endeavors. They should not be viewed as replacements for the above program but as additions to it. They can be explained to the child as helping agents for strengthening his "sentry." These products can be prescribed only by the family physician.

Retraining through conditioning devices which either ring a bell or light a bulb thereby awakening the bedwetting child as his urine soaks through an electric pad under his sheet is yet another approach to be attempted if the above described methods fail.

Should repeated attempts at training fail and the child advance well into the elementary school years, one must assume the problem to be a deep and complex one requiring the expertise of a child psychiatrist. Naturally, the possibility of a physical basis for the bedwetting must be kept in mind at all times and clarified.

"A tender nest of soft young hearts, each to be separately studied, curious eager flock of minds to be severely pained and tutored." Tupper

AMA Prescribing Guidelines

- Use barbiturates and other sedative-hypnotics for relief of severe symptoms, but avoid them for minor complaints of distress or discomfort.
- Attempt to diagnose and treat underlying disorders before relying on drugs of this class for symptomatic relief.
- Assess susceptibility of the patient to drug abuse before prescribing barbiturates or any other psychoactive drugs. Weigh benefits against hazards.
- Use dosages that will not lower sensory perception, responsiveness to the environment or alertness below safe levels.
- Know how to administer barbiturates when clinically indicated for withdrawal in cases of drug dependence of the barbiturate type.
- Using periodic checkups and family consultations, monitor possible development of dependence in patients who are on an extended sedative-hypnotic regimen.
- Prescribe no greater quantity of a drug than is needed until the next checkup.
- Warn patients to avoid possible adverse effects because of interaction with other drugs, including alcohol.
- Counsel patients as to the proper use of medication—follow directions on the label, dispose of old medicine no longer needed, keep medicine out of reach of children, do not "share" prescription drugs with others.
- Convey to patients through your own attitude and manner that drugs, no matter how helpful, are only one part of an overall plan of treatment and management.

—Reprinted with permission of Roche Laboratories

Adjustment to Overseas Living

LT M.W. Peterson, MC, USNR

Successful adaptation to overseas living necessitates knowledge of certain physiologic and psychological processes. Psychologic adjustment depends on personality characteristics that include adaptability, flexibility, and intelligence. A review of a number of studies examines the adjustment of people adapting to new cultures.(*1*) Common throughout these studies is the fact that everyone undergoes major changes when in a new culture and these changes can either result in adaptive growth or maladaptive distress.

Separation. The first task of adjustment to a foreign culture is dealing with separation issues. Often, young adults are having to leave home for the first time. Virtually everyone leaves behind some family members, if not many close friends. This change in living involves geographic separation, moving a house and belongings, and undergoing some modification of job. These kinds of changes in living patterns (even if the change involves a promotion) increase the incidence of physical and emotional illness.(*2*) Thus many travelers find themselves having to cope with an illness (though usually mild) when adjusting overseas.

LT Peterson is chief of psychiatry at U.S. Naval Regional Medical Center, Yokosuka, FPO Seattle 98675.

Jet Lag. A major physiologic adaptation confronts the traveler when he arrives. It has been demonstrated that there is a decrease in REM (Rapid eye movement) sleep after trans-Atlantic air travel.(*3*) This and circadian rhythms are often disrupted for weeks after an overseas flight. At least a day of adjustment is needed for each hour gained or lost through time zone changes.(*4*)

Personal experience with a trans-Pacific move revealed to this observer that for a number of days (indeed for two or three weeks) sleep patterns were disturbed and fatigue was quickly felt. Often within a 24-hour period one feels alternately energetic, even euphoric, and then after one or two hours this euphoria quickly changes to fatigue and depression. It is speculated that this cycling of mood is secondary to a natural tendency of the brain to continue its cycle of REM sleep activity while in the waking state. (*5*) Perhaps the cyclic fatigue felt after a switch in day-night schedule comes up whenever the brain should be passing through REM sleep (which would be about every 90 minutes during a normal night's sleep).

Culture Shock. Psychological adjustment to cultural change occurs in a characteristic "W" pattern. (*6*) Initially, expectations are high, the new culture has excitement and new adventures are enthusiastically begun. When the difficulties of learning a new language emerge, when the new culture loses its glow, and when the deficiencies of the alien country become more evident, a decline in adjustment occurs. Depending upon the expected length of overseas living this decline may become evident within a few weeks, but usually appears about six months after arrival.

A similar phase of adjustment occurs when a professional enters a new system or community. There is a "honeymoon" phase of adjustment when the newcomer can do no wrong and all doors are open. When this period ends and the reality of the newcomer's situation becomes evident, there is often a decline in interest, energy, and performance.

As the anticipated end of overseas living approaches, a renewed energy and enthusiasm for the nonnative culture occurs. This positive approach lasts until the transition back to the native culture is made. Another backslide occurs when the old culture is reassessed in light of the new experiences and knowledge gained. Acquaintances have to be renewed, ties with relatives become tighter, perhaps even restrictive. Again a change in work position, separation from friends, and loss of "foreigners" status have to be contended with.

The manner in which a person adjusts depends mostly upon his or

her underlying personality. It is very difficult to predict with certainty how an individual will do, but if a person maintains an open, optimistic attitude, remains active in seeking out fresh knowledge of the culture, he will tend to adjust better than a person who is inflexible, and cannot bounce back from the inevitable mistake made when trying to communicate across cultures. Humor and a strong sense of self-worth are assets. Accumulated experience with Peace Corps volunteers has shown that placement in an urban area, high ability to learn a new language, having a well-defined and familiar occupation that is gratifying, having control over the situation, and being in a culture that is fairly similar to the native culture will increase a person's chances of good adjustment. (*7*)

The Dependent Spouse. There appears to be a greater difficulty for a non-working dependent spouse to adjust to overseas living. Two factors contribute to this. First there is not a well defined role for a dependent. Since there is neither an extended family nor a group of close friends to relate to there is enforced dependency upon the working spouse. Secondly, the relatively idle spouse often has much more contact with the alien cluture as in food buying, taking care of household chores, and making brief sightseeing trips. The increased exposure can mean more stress.

Little America. There is a definite cultural adjustment also to the enclave of Americans that make up the military base or foreign community. Initially, or if proper adjustment to the foreign culture is not made, the base or an American club becomes the center of most socializing, and is the provider of necessities and entertainment. Its small town atmosphere is very different for urbanites who transfer from the U.S. On the positive side, as the overseas family adjusts and spends more time exploring the host country's culture, the base or American community can provide a comfortable piece of Americana, where the traveler can rest and replenish his energy for further sojourns. It also can be a place to visit with foreign friends and show them aspects of American culture.

Alleviating the Symptoms. From these studies and treating distressed families it is evident that adjustment can be smoother. Physical adjustment is easier if the traveler allows his circadian rhythms to return to normal as fast as possible. Imbibing alcohol during or after a lengthy flight delays and makes more difficult the physiologic adjustment that has to occur. Ethanol, barbituates, and amphetamines suppress REM sleep; in addition REM sleep time is decreased after trans-Atlantic flights. REM deprivation results in fatigue and decreased tolerance for stress. Therefore, adding a REM suppressing medication to a traveler already REM deprived can only make adjustment that much more difficult. If a person cannot naturally readjust his sleep/wake cycle, use of Flurazepam HCL (Dalmane®) at bedtime for a few days would be of great help, since it and other benzodiazapines do not alter REM sleep. Rest after arrival is essential. Major decision making, beginning new ventures, extensive sight-seeing, etc. should be delayed until the body has overcome the shock to its circadian rhythms.

Exposure to someone knowledgeable about the new culture can be of immense benefit. The U.S. Navy, for example, has a sponsor system that, if utilized properly, makes adjustment go smoothly. Newly arrived personnel are met at the airport by a person close in age, marital status, and rank, whose job is to help out with adjustment in the first few weeks.

Practical instruction (the U.S. Navy's Inter-Cultural Relations workshop) in the cultural mores and basic language training will give a newly arrived foreigner a sense of assurance; mastering the foreign culture's nuances can begin quickly.

Isolation from others, withdrawal to an unvarying routine, or constant contact only with Americans is a kind of adjustment, but a poor one. Taking some risks in venturing out into a foreign land will allow an opportunity for learning. Contact with a culture other than our own increases to a huge degree knowledge about our own. Personal growth should be the outcome of residence overseas.

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Prison Diary

In 1967 Isabell C. Meyers of Long Beach, Calif., donated to BUMED a diary, medical kit, and wartime mementoes of her late husband. Chief Pharmacist's Mate and later CDR Adolph Wessel Meyers, MSC, USN. The diary, written while Meyers was a POW, gives a vivid and often poignant account of deprivation, sacrifice, and survival. It also documents one man's heroic effort to ease the suffering of his comrades.

On the day of his capture, Adolph Wessel Meyers was 36 and had already spent nearly half his life in the Navy, most of that time as a corpsman aboard battleships and as a medic with the Marine Corps.

Chief Meyers was a short but exceedingly strong man for his size with clear, blue eyes and just a sprinkling of gray hair. His quick and winning smile endeared him to his patients. Those who knew him benefited from his warmth, cheerfulness, and generosity.

When Japanese bombs fell on Guam 8 December 1941, Meyers was on duty in the personnel office of the U.S. Naval Hospital in Agana. Two days later he became a prisoner of war.

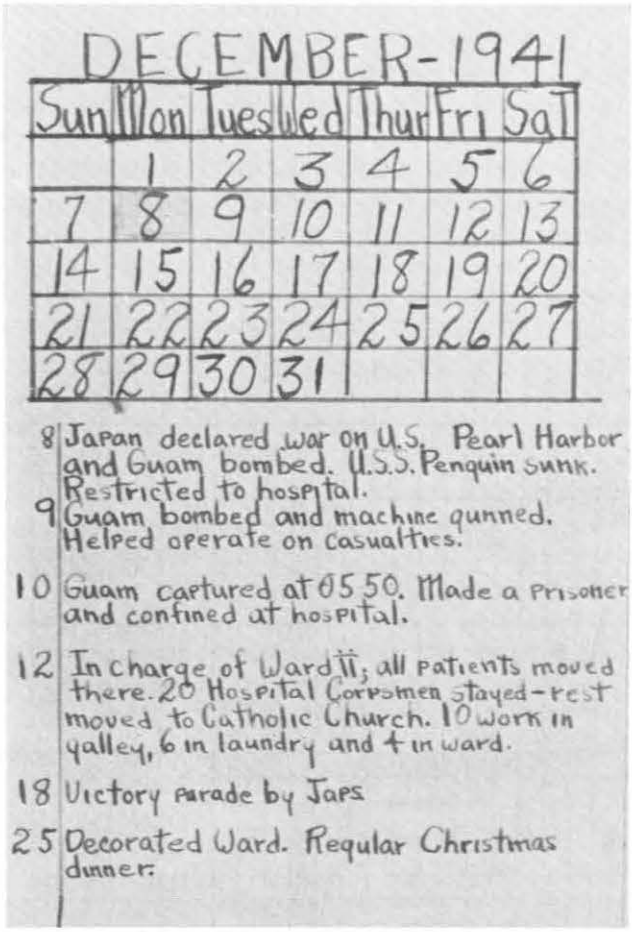
Through much of the next 45 months and four prison camps or bunshos, he kept a diary. In August 1944, after his captors began again to confiscate personal effects and other contraband, the document was smuggled out of prison by a friendly Japanese.

The diary's entries are often terse but revealing. Ever wary of his Japanese guards, and with life itself reduced to its simplest common denominator, Meyers wrote only about essentials—passing the time, simple and rare pleasures, fleas, bed bugs, and the illness, treatment, and tragic loss of his buddies. Important dates he highlighted in red—his wedding anniversaries and the birthdays of his loved ones were ever on his mind.

We can read between the lines and perceive the loneliness, the boredom, and the brutality. Yet we also sense a modest man whose inner strength and dogged persistence sustained him and his patients through four long years of captivity.

"The Navy Department announced that it is unable to communicate with Guam either by radio or cable. The capture of the island is probable."*(1)*

This terse communique issued by the Navy 13 December 1941 reported the probability of an event that had already taken place.



DECEMBER-1941

Sun	Mon	Tues	Wed	Thur	Fri	Sat
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

8 Japan declared war on U.S. Pearl Harbor and Guam bombed. U.S.S. Penquin sunk. Restricted to hospital.

9 Guam bombed and machine gunned. Helped operate on casualties.

10 Guam captured at 05 50. Made a prisoner and confined at hospital.

12 In charge of Ward III; all patients moved there. 20 Hospital Corpsmen stayed - rest moved to Catholic Church. 10 work in galley, 6 in laundry and 4 in ward.

18 Victory parade by Japs

25 Decorated Ward. Regular Christmas dinner.

A page from history. Meyers has the attack on Pearl Harbor occurring on the 8th because Guam is located on the western side of the International Date Line.

The end for Guam had begun shortly after 0800 on 8 December—7 December on the other side of the International Date Line—when Japanese bombers unloaded their deadly cargoes over the defense facilities of Apra Harbor. The following day three air attacks took place, the last described by the military governor, CAPT George McMillin, USN, in his last message: "Last attack on Agana. Civilians machine-gunned in streets. Two native wards of hospital and hospital compound machine-gunned . . ."*(2)*

The American defenders, 400 naval personnel and 155 Marines, were no match for the Japanese invaders. For Leona Jackson, of the Navy Nurse Corps, the

bitterest moment of her life ". . . came at sunrise [on the 10th] when, standing in the door of the hospital library, I saw the Rising Sun ascend the flagpole where the day before the Stars and Stripes had proudly flown."(*3*)

For Chief Pharmacist's Mate Adolph Wessel Meyers and other members of the hospital staff there would be many bitter moments; at 0550 their long, painful ordeal as prisoners of war began.

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10 December 1941

. . . Buried 14 dead shortly after capture. All American and native nurses work in Ward II. Japs took over remainder of hospital . . .

The suddenness and ferocity of the Japanese attack had dazed the survivors, yet the medical personnel continued to treat the badly injured casualties.

For the next three weeks the Japanese allowed the Americans to continue treating patients. Then, self-rule suddenly came to an end. After being forced by their captors to witness a victory parade, the prisoners were herded aboard a Japanese merchant vessel for a four-day trip to Japan. The first stop was a hastily constructed POW camp on the island of Shikoku.

Zentsuji

The 400-500 Americans were ill prepared for what awaited them. As they disembarked in the remnants of their tropical uniforms, they shivered in the frigid air. Many were surprised to find what kind of winter Japan really had.

The Japanese had built Zentsuji camp at the base of a steep mountainside about five miles inland from the port of Tadotsu on the northern coast of Shikoku. Living quarters were unpainted frame structures and unfortunately, too well ventilated. Many of the walls had large gaping cracks which allowed the wind to whistle through unhindered.

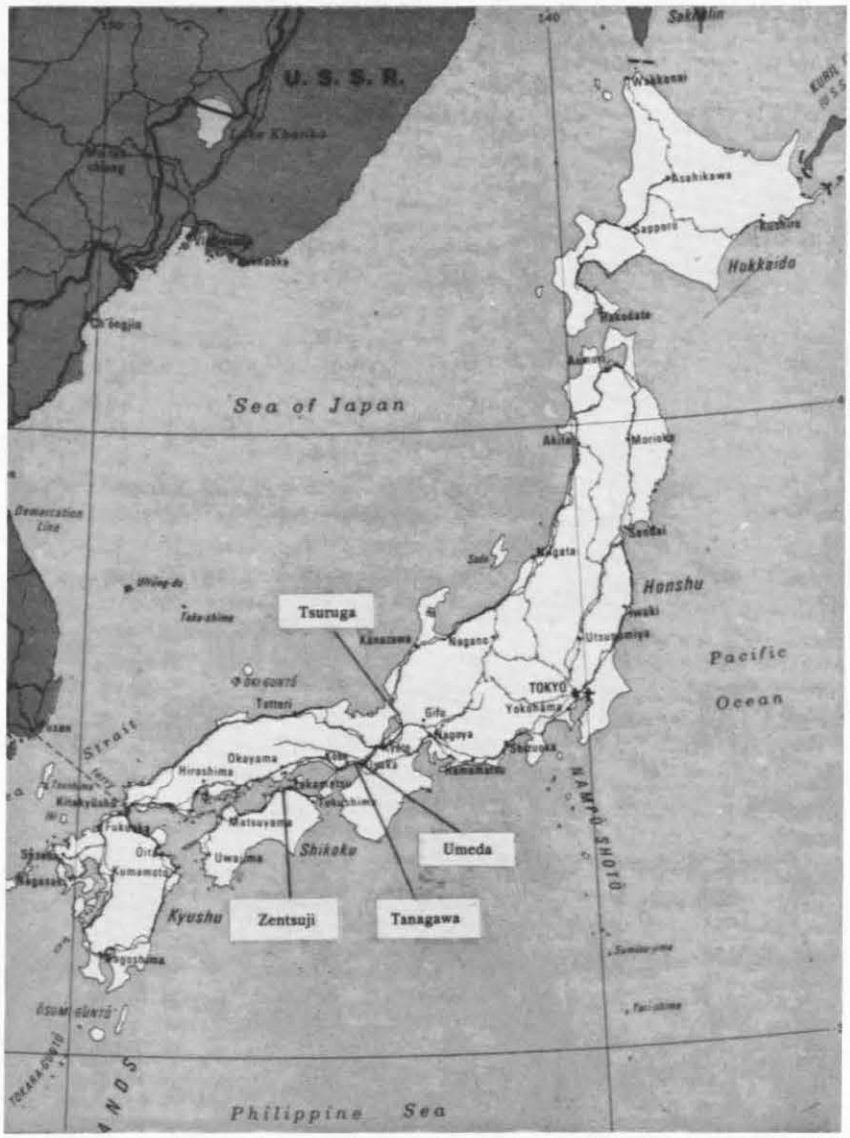
Sleep for the weary prisoners came hard. Flimsy, raised wooden platforms covered with filthy straw mats offered little insulation either from the cold or the hoards of rats that noisely carried on their nocturnal activities beneath. Pillows were bags of light canvas filled with rice hulls.

Each building housed from 24 to 125 men. Charcoal-fueled hibachis, one to a building, provided the only heat, but more often the men had to pull their vermin-infested blankets over their heads to keep warm.

Yet for all its shortcomings, Zentsuji was a model camp, and for propaganda purposes, photographers were initially allowed to wander about to see how well Japan treated her prisoners of war.(*4*)

A wing of the U.S. Naval Hospital in Agana, Guam as it appeared on 10 December 1941, the day Meyers was captured.

The camps



27 February 1942
Oesa Yama working party started.

The Americans were not long at Zentsuji before the Japanese began organizing work parties. Oesa Yama was a land reclamation project about three miles from the camp. Because arable land was always at a premium in Japan, the Japanese decided to terrace a mountainside by having prisoners remove large rocks and boulders.

The work day was from five to eight hours long with Sunday a rest day. The men carried their food with them in mess kits and were given hot tea to drink. Later as they became more accustomed to the strenuous work, more was expected of them. The guards measured off a certain area for each work detail to dig and clear of rocks. They could not return to camp until they had completed their quota. It later turned out that this work project was easier than most.

Other prisoners were chosen for stevedore work and sent to Osaka to work on the docks. The Japanese forced some to work at a railroad station near Zentsuji loading and unloading freight cars.

17 May 1942
Had my first banana—wonderful.

Men, accustomed to wholesome Western food in large quantities, were in for another surprise. The typical Japanese civilian diet was spartan, consisting mainly of rice and vegetables. Prison chow was another story. The limited quantity of rice was sometimes augmented by a soup made of bones and putrid fish scraps. Infrequently, the prisoners ate vegetables, fruits, soybean milk, and very rarely an egg. The rice usually came mixed with barley, wheat, beans, tough corn, or pebbles.

Bones, taken from the soup, were rotated among the messes and after the men had stripped what they could, the bleached remnants were returned to the galley to be counted and saved for the next meal.

Although an American was in charge of the mess, a Japanese mess sergeant supervised the distribution. Rice was rationed by a certain number of grams per individual, depending upon whether he was an officer, heavy worker, or camp detail POW. Those performing heavy labor got more to eat.

Sanitary conditions in this and other camps were frightful. Latrines were straddle trenches enclosed in a row of small closets. Each closet was about one and one-half yards long by one yard wide with an opening in the floor. Each individual carried his own toilet paper when it was available. The odor from the latrines permeated every building in the camp.

27 March 1942
16 cases of Dysentery in camp.

Not surprisingly, the harsh prison environment and poor nutrition soon turned prisoners into patients. And there were many. By now the original contingent from Guam had swelled as America's fortunes in the Pacific continued to suffer. Chief Meyers and his colleagues had much to keep them busy.

Before leaving Guam, he and the other medical personnel concealed various instruments and medicines in their luggage. What the Japanese had not confiscated they used in treating the prisoners.

An American doctor conducted sick call twice daily in a small dressing room equipped with a table and a limited supply of Japanese medical equipment. A single faucet provided the only source of water. When turned on, a cold trickle flowed onto the concrete floor. The corpsmen kept a weak disinfectant solution in small quantities in a pan resembling a basin. Warm water was unavailable.

A small ward nearby housed about 12 to 15 patients whose beds were on a platform about two feet from the floor. This platform was covered with a thin straw mat and a canvas covered straw mattress. There were no sheets. Flea-infested blankets lay upon the mattresses.

A hibachi stood in the center of the ward upon which they could heat tea and water. Later a coal stove replaced the hibachi but there was rarely enough coal to keep it going except for very short intervals.

28 May 1942
Attended lecture on Merchant Marine by Ensign Wood. Signed pledge not to escape.

Even with the grueling work details at Zentsuji, there seemed to be enough time for prisoners to contemplate their situation and long for deliverance. Maintaining morale was not easy, but the camp's American officers tried to maintain military discipline. They organized classes and lectures on a myriad of subjects: hygiene, bookkeeping, math, salesmanship, the characteristics of motor oil, travel experiences in Central America, and many others. "Sing songs" and talent shows became quite popular.

Signing escape pledges were not seen as disloyal acts. The idea of escape from Zentsuji or any other camp in Japan for that matter was ludicrous. Westerners could hardly blend into the civilian population. Those who refused to sign were locked up and put on short rations. In return for the pledge, prison officials allowed the prisoners to take supervised walks through the nearby hills and mountains. They could also play catch and cricket on rare occasions.

31 October 1942
2 more carloads Red Cross supplies brought in—was rec'd in Japan 8-2-42. Rumored there will be no more milk because many wounded [Japanese] soldiers returned here and need the milk. What will our 3 wks old puppy, Optimo do?

The prisoners looked forward to Red Cross shipments and parcels from home, but such treats were few and far between. Japanese guards opened packages, con-

A. MEYERS AT OSAKA CAMP WRITES HOME

After months of waiting, Mrs. Adolph Wessel Meyers, 6204 Makee avenue, has received a letter from her husband held a prisoner of war by the Japanese at Osaka prison camp. This was the first word that had come from Chief Pharmacist's Mate Meyers since October, 1943.

The letter was dated July 31, 1943, taking more than a year to reach here. In it Meyers stated he was doing medical work and getting along as well as could be expected under the circumstances, and said he was fervently praying to be able to join his family and is patiently looking forward to a glorious reunion.

Meyers has been in the U. S. navy for 19 years. He was formerly stationed at the naval hospital at Guam and has not seen his family for about four years.

WAR PRISONER WRITES TO WIFE FROM JAPAN

This week a letter was received by Mrs. A. W. Meyers, 6204 Makee avenue, from her husband Adolph Wessel Meyers, a war prisoner of the Japanese, describing his treatment at the hands of Nip jailers.

Meyers, a navy warrant officer, was captured while stationed at the naval hospital in Guam and has been at Zentsuji war prison camp in Japan since Jan. 10, 1942. He is 38 years of age and has been in the navy 18 years.

It took nine months for the latest letter to reach Mrs. Meyers and was not as encouraging as one received in early September of last year.

Meyers stated he was doing medical work in the camp while most of the other prisoners were working the soil for cultivation, their only recreation being a short hike once a week, under guard, to break the monotony.

He said he could not get used to the food and now weighed only 112 pounds. His former weight was 145 pounds. He added that he was feeling reasonably well.

HUSBAND SAFE IN PRISONER OF WAR CAMP

It was wonderful news for Mrs. Wessel Meyers of 6204 Makee avenue, when she learned her husband is alive and well, having been a captive of the Japs for 3½ years.

This news reached Mrs. Wessell through the Red Cross, at which time she was also told that she may correspond with him, until his return to the states. It is expected that he will be flown to San Francisco in the near future.

The last word Mrs. Meyers had from her husband was last spring, when he said he had received pictures of her and their three children, Wessel Jr., 17, Betty Lou 16, and Billy 5. Since that time and up to the world from the Red Cross, Mrs. Meyers had no further communication from him.

Meyers is a chief pharmacists mate and has been away from home for the past 4½ years. Upon his arrival he will find that Wessell Jr. has joined the navy too, and is stationed at San Diego.

ON WAY HERE AFTER YEARS IN PRISON

It was just announced this week by the War Department that Chief Pharmacist's Mate, Adolph Wessel Meyers, U. S. Navy, has been released from a Japanese prison camp at Osaka.

Meyers was captured on December 10, 1941, while stationed at the hospital on the island of Guam. His family has not seen him for four and a half years. The Meyers have three children, Billy, 5, who has not seen his dad since he was five months old, and who now attends kindergarten at Miramonte school; Betty Lou, 16, and Wessel, 17, now in boot training at San Diego, Naval training center.

Letters have been received from friends who have talked to former prisoners, telling glaring accounts of Meyer's actions, keeping Japs away from sick fellow prisoners. One told of the many lives he had saved due to his wonderful care, where he did medical work at the Osaka hospital for prisoners of war.

Clippings from a wartime Los Angeles paper tell of Meyers' imprisonment.

fiscated razor blades, games, pencils, and other personal items, ate whatever candy they found, and cut up bars of soap, ostensibly looking for hidden messages.

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28 August 1942
At last letters received [from] Betsy, Dorothy and Mary Katherine—Am wonderfully happy.

The Japanese allowed each prisoner to write one letter every five or six months and limited each to 300 words. There was a prescribed format. They could mention certain things such as receipt of mail from home, how they missed their folks, request certain items except for food, and write about very general topics. They could not mention work, the location of the camp, their health—unless it was good—and how they were being treated unless that too was favorable. Usually about 20 incoming letters were doled out each day after being censored.

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8 January 1943
It is rumored that 50 men including 2 Chiefs will soon leave for parts unknown. I am one of the Chiefs.

What awaited Chief Meyers and his comrades was far worse from what they had ever known at Zentsuji.

Tanagawa Death Camp

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13 January 1943
Arr. Osaka 0500—Short trolley ride. 0715 boarded elec train and arr Tanagawa 0815. Was in charge of party. Assigned to Med. duty. 2 Army medicos here. Prison number 508. Living in Bks III. Epidemic of diarrhea. In charge of Bk II; 70 sick there.

The 50 men arrived on the outskirts of Osaka after a trip by boat and train. Guards ordered Chief Meyers to select those unable to walk the distance of four or five miles to the camp and have them ride in a dump truck. As the rest marched along the road under guard they heard strange American voices from the various work projects shouting "You'll be sorry." When they arrived at Tanagawa, they realized what the voices meant.

Meyers was shocked and revolted by what he saw. The camp's inhabitants were Army, Navy, and Marine prisoners that had already lived through the horrors of Corregidor and Bataan. They had arrived in Japan in poor health yet had been forced to work through the winter with inadequate clothing and poor food. Their ration was the absolute minimum and the men were dying at about the rate of one a day. Out of the original 454 officers and men in the camp from the Philippines, about 100 had died, principally from dysentery brought on by the abominable sanitary conditions. The others were suffering from malaria, dengue fever, diarrhea, and beriberi.

Meyers took over the hospital, a building in which 100 patients were crowded in the most unspeakably filthy conditions. He did not understate the situation when he added a note to his diary: "Morale here is very low. All these men are from the Philippines and have gone thru most horrible experiences . . . some are quite ill mentally." During that first month at Tanagawa he could do little but watch helplessly as 19 more victims succumbed to pneumonia, dysentery, or malnutrition.

Besides the many illnesses, Meyers found the camp crawling with lice which the prisoners had picked up enroute from the Philippines. Due to a shortage of fuel and caldrons to boil the camp clothing, it took nearly two months to rid the camp of the vermin.

His first priority was securing medicine; Tanagawa had few medical supplies. A barracks stood adjacent to the hospital. In it about 25 to 35 men convalesced from weakness and illness which the Japanese considered of a minor nature. In the prison administration building was a small closet-like room called the "Death House." Here there was space for about eight patients whose condition was so critical that survival seemed beyond hope. Next door, in a little medical office, the Japanese made out their medical reports and issued small quantities of what scant medicine was available.

The Americans held sick call in the cramped hallway of the Japanese administration building. There were no tables. Two benches had to suffice for dressings and treatments.

Chief Meyers and his colleagues found it necessary to practice stringent conservation. They washed and rewashed gauze or bandage material and used it on the various wounds until it disintegrated. After a patient's treatment was completed, he was instructed to scrub his dressings so they could be reused. No sterilization equipment existed at Tanagawa.

For the remainder of that winter of 1943 and into the spring, Meyers worked day and night scrounging medicine and treating the sick. One survivor estimated that he alone saved the lives of at least 25 men. No one could imagine from where he drew his strength.

The contents of Chief Meyers' medical kit. Two of the instruments were made by prison inmates—the spear-shaped scalpel ground from a dental spatula, and the probe just below it made from a spring.

6 May 1943
Went to Fuke with Masaki, bought much medicine; had apple and soda.

Suddenly, the hard work and the pleading began to pay off. A Japanese sergeant and his assistant in charge of medical facilities had always shown sympathy toward the prisoners, particularly the sick and injured. Meyers persuaded the two men that more would needlessly die without medicine. They took the Chief to town several times and made the rounds of the local drug stores, buying medicines the sergeant paid for out of his own pocket. They were able to procure vitamin tablets and, most importantly, magnesium sulphate or Epsom salts. Meyers soon discovered that this drug, when administered properly, would cure diarrhea. The Chief owed much to his two Japanese friends. In a camp where brutality against Americans was commonplace, their concern was nothing less than phenomenal. When any of the prisoners died, Sergeant Hyashi seemed more bereaved than the Americans themselves.

Around the middle of March 1943, the Japanese moved the Chief and his patients to a new barracks fitted out as a hospital. It was a vast improvement over the old lodgings and more medical supplies were available. The Japanese closed the "Death House" and morale and health suddenly began to improve.

The quality of life in Japanese captivity could rapidly go from bad to worse as the prisoners quickly learned. No sooner had the patients settled into their new medical barracks than rumors began to fly that they would be shipped to another prison. A mood of apprehension and forboding settled over the camp.

(To be concluded in the October issue)

Notes

1. Karig, Walter, et al., *Battle Report: Pearl Harbor to Coral Sea,* 107.
2. ibid. 108.
3. ibid. 109.
4. Marek, Stephen. *Laughter in Hell: Being the True Experiences of LT E.L. Guirey (USN) and TSGT H.C. Nixon (USMC) and Their Comrades in the Japanese Prison Camps in Osaka and Tsuruga,* 14.

A Qualitative and Quantitative Drug Use Review: Cephalosporins and Aminoglycosides

LT Ron E. Whiten, MSC, USNR

In October 1977, the Committee on Nosocomial Infections at NRMC Portsmouth, Va., began a prospective review on the utilization of intravenous cephalosporins and aminoglycosides. Three cephalosporins (cephalothin, cefazolin, and cephapirin) with four aminoglysosides (gentamicin, tobramycin, amikacin, kanamycin) were studied. The purpose of the review was to collect, organize, analyze, and report information on the rationality of drug usage.

Methodology

The pharmacist in the Intravenous Admixture Room recorded the name and hospital identification number of all patients receiving cephalosporins and aminoglycosides during the month of October 1977.

The Medical Audit Assistant of the Medical Records Branch reviewed the patients' charts and recorded the clinical information required to evaluate the quality of care. Diary entries included:

- patient's name,
- hospital registry number,
- age,
- sex,
- admission date,
- discharge date,
- drug used,
- dosage,
- date ordered,
- date discontinued,
- site of infection,
- class of infection,
- culture and sensitivity, and
- laboratory management of aminoglycosides.

The indication for use of the antibiotic was noted as: (1) Nosocomial (site of infection was related to a surgical procedure or mention of the infection being nosocomial was made in the chart); (2) Prophylaxis (an attempt was being made to prevent infection when there was no evidence of infection at start of treatment); (3) Unknown (no definite site of infection was recognized or statement that the medication was being used prophylactically); and (4) Community Acquired (infection acquired prior to admission).

Laboratory management for aminoglycosides was subdivided into:

- Blood Urea Nitrogen (BUN) or creatinine ordered prior to start of antibiotic, and
- followup for BUN or creatinine at least every three days.

An audit board or Professional Standards Review Organization (PSRO) reviewed only the completed chart, as did the Joint Commission on Accreditation of Hospitals (JCAH). All completed charts were sent to Medical Records Branch upon discharge of the patient and, hence, the medical audit assistant became the key individual in recording clinical data. Parameters were explicit and required minimum interpretation. The period of time involved was longer than anticipated as one patient was not discharged until 24 March 1978; therefore, the Medical Records Branch was not able to complete its report until April 1978. The clinical pharmacist interpreted the data and reported his findings to the committee meeting in July 1978.

LT Whiten is a clinical pharmacist with the Pharmacy Service at NRMC Portsmouth, Va. 23708.

The author thanks CDR Gary W. Watson, MC, USN, Head Infectious Disease Division; LCDR Bob Thompson, MSC, USN, Clinical Pharmacist; and Mrs. Liz Reid, Medical Audit Assistant, for their assistance in preparing this report.

Results

A total of 60 patients participated in the study—27 male and 33 female. Cephalothin was administered to 42 patients, cefazolin to 4 patients, gentamicin to 26 patients, amikacin to 1 patient, and combination of cephalothin and gentamicin to 12 patients. Cephapirin, tobramycin, and kanamycin were available but were not prescribed during the period studied. Other parenteral antibiotics may have been used concomitantly but were not included in this study.

Cephalosporins

Thirty-three patients were identified as receiving a parenteral cephalosporin—15 male and 18 female. Hospitalization ranged from 4 to 76 days with an average stay of 14.85 days. The most frequently prescribed cephalosporin was cephalothin administered as one gram every six hours (16 patients) and two grams every six hours (5 patients). Cefazolin was prescribed for four patients; one patient received 500 mg every six hours and three got 500 mg every eight hours. It was noted that one patient initially received cephalothin for two days and then the order was changed to cefazolin for two days.

Duration of therapy (Table 1) ranged from one dose to 22 days of continuous therapy with an average therapy period of 6 days.

The sites of infection were compiled into anatomical categories where two or more cases were documented (Table 2). It was noted that 15 cases, or 45.5 percent, had no documentation as to site of infection.

Prophylaxis was recorded (Table 3) as the primary use (48.5 percent) of the cephalosporins. Some of the indications classed as "unknown" may also have been actually used prophylactically.

On performing appropriate cultures and sensitivities for cephalosporins, some interesting information was revealed from the charts. There were 7 cases where the culture and sensitivity (C & S) had not been ordered, 5 reports of "no growth," and 21 cases reporting positive growth. Of the 21 positive cultures, only 16 had sensitivities documented in the patients' records. In the five cases where "no growth" had been reported, the antibiotic had been properly discontinued.

Aminoglycosides

Fifteen patients received an aminoglycoside as an intravenous antibiotic—4 male and 11 female. Hospitalization ranged from 3 to 24 days with an average of 10.33 days. Twelve of the 15 patients received the dosage of 80 mg every eight hours.

The average length of therapy was 6.3 days with a range of one dose to ten days. Data on duration of therapy, sites of infection, and indications for use of the aminoglycosides are given in Table 4.

Of the patients receiving aminoglycosides, there were two reports of "no growth," and only one chart did not have documentation of a C & S. In the 12 positive cultures, four patients did not have reports of a sensitivity and one report recorded resistance to gentamicin. The patient with the resistant strain had a nosocomial infection of the vaginal cuff and the medication was continued.

As to monitoring the potential nephrotoxicity of patients on aminoglycosides, all 15 patients had had a BUN or creatinine ordered prior to starting therapy. Twelve cases fell within our dictated followup of a repeat BUN or creatinine every third day. One case had repeat lab work about every fourth or fifth day. Another case had not had a BUN or creatinine ordered since admission (received gentamicin for five days). A third case had six days of therapy with lab work after commencing therapy.

TABLE 1. Duration of Therapy for Cephalosporins

Less than five days	22 patients
Five to ten days	6 patients
Greater than ten days	5 patients

TABLE 2. Site of Infection

No documentation	15 cases
Skin wounds	5 cases
Orthopedic	3 cases
Urinary tract	3 cases
Others	7 cases

TABLE 3. Indications for Use

Prophylaxis	16 cases
Unknown	10 cases
Nosocomial	6 cases
Community	1 case

Cephalosporins and Aminoglycosides

There were 12 patients who received a cephalosporin and an aminoglycoside during their hospitalization. Age range in this group was 5 years to 71 years with seven male and five female patients. Length of hospitalization ranged from 6 to 150 days.

Six patients were started on both a cephalosporin and an aminoglycoside and continued on both drugs throughout their therapy. Four of the six patients were reported to have nosocomial infections and two of the infections were categorized as unknown. Table 5 gives data on sites of infection and indications for use.

In the 12 patients treated with the combination of a cephalosporin and an aminoglycoside, all but one case received the products cephalothin and gentamicin for the duration of their therapy. The exception was a patient with a nosocomial infection who had received seven days of therapy with amikacin after receiving six days of gentamicin. This patient also received 23 days of cephalothin.

As to the C & S, only one patient had a report of "no growth" and the medication was discontinued upon receipt of the lab report.

Summary

In the study 33 patients were treated with a parenteral cephalosporin, and 12 additional patients received both a cephalosporin and an aminoglycoside. Cephalothin was the most frequently prescribed cephalosporin at a dosage of one gram every six hours. The primary use for the cephalosporins was prophylaxis (48.5 percent). In 45.5 percent of the cases reviewed, the site of infection was not documented in the chart. Only 67 percent of the patients' charts contained a report of a positive culture, and 67 percent received a cephalosporin for less than five days. A total of 1,301 grams of cephalothin and 33.5 grams of cefazolin were used in the study.

Fifteen patients received parenteral aminoglycosides as their single antibiotic; of the four available on the formulary, gentamicin was most frequently ordered using the dosage of 80 mg every eight hours.

Infection located in the pelvic area constituted 53.3 percent of the gentamicin used. The class of infection was equally divided between nosocomial, prophylaxis, and unknown. On the followup of BUN and creatinine laboratory work, 80 percent of the cases reviewed met the protocol standard of obtaining the lab work every three days, and 93.3 percent had had a BUN or creatinine ordered during the therapy period. A total of 38.8 grams of gentamicin was used.

TABLE 4. Aminoglycosides

Duration of Therapy	
Less than five days	7 cases
Five days or greater	8 cases
Site of Infection	
Pelvic	8 cases
Abdominal	3 cases
No documentation	1 case
Other	3 cases
Indication for Use	
Nosocomial	5 cases
Prophylaxis	5 cases
Unknown	5 cases

TABLE 5. Data

Sites of Infection	
Abdominal	4 cases
Skin	2 cases
UTI	2 cases
Not documented	1 case
Other	3 cases
Indication for Use	
Nosocomial	6 cases
Unknown	6 cases

Discussion

We were able to identify specific deficiences in prescribing habits of practitioners. Due to the lack of proper documentation and scarcity of notes, we were unable to properly monitor the drug therapy to determine the physicians' thoughts by our parameters. Many of the charts where the indications for use had been classified as unknown may have really been prophylaxis in nature.

However, merely recording less than ideal prescribing practices does not guarantee changes in the prescribing patterns. It would seem much better to promote rational drug therapy by education of physicians. By tradition this is carried out through consultations and formal teaching rounds. The efficacy of these methods in promoting rational antibiotic therapy would seem obvious, but it remains largerly unproven.

Whether the changes in prescribing patterns brought about by review of drug usage are transient or permanent remains to be seen.

Temporal Lobe Seizures Simulating Anxiety Attacks

CDR Jesse O. Cavenar, Jr., MC, USNR-R
CAPT Michael A. Harris, MC, USN

Anxiety manifests itself clinically in many patterns, ranging from the bound anxiety of some psychosomatic disorders to the free-floating anxiety attacks that are frequently seen in medical practice. According to French (*1*) "morbid anxiety, which is unwarranted by the real situation, is the commonest psychiatric symptom." Anxiety is so prevalent that many physicians do not consider it difficult to diagnose with accuracy. Yet, many conditions, both psychogenic and physical, can simulate acute anxiety attacks. Most experienced clinicians have had cases in which a patient was initially thought to have straightforward anxiety attacks, and was later discovered to have Grave's disease, diabetes mellitus, a progressive central nervous system disease resulting in a tremor, or some other significant physical problem which was subsequently diagnosed.

The purpose of this case report is to again alert the clinician to the fact that the most common of psychiatric symptoms may be most difficult to diagnose.

Case Report

A 19-year-old single white male sailor sought psychiatric consultation because of a six-year history of recurring episodes characterized by anxiety, a feeling of tightness in the throat, and recalling past events. These episodes occurred as frequently as three or four times per day, or as infrequently as once a month. The frequency and severity of the attacks had increased over the past 6 to 12 months, and had become associated with nausea and a mild headache. The past events which he would recall were not consistently good or bad, and were not a single memory or memories which recurred repeatedly. These attacks might appear at any time, under any circumstances, and could not be related to a particular situation.

His past history was characterized by multiple traumas. The mother had abandoned the family following the father's sudden death of a myocardial infarction when the patient was 12. The patient had then lived with two different foster families between ages 13 and 17, finally quitting school in the 10th grade, despite good grades, because of friction and dissatisfaction with the foster parents. He had then entered military service; his military record indicated a dismal performance due to disinterest, defective attitude, authority conflicts, and a persistent need for close supervision.

The mental status examination revealed a cooperative, almost obsequious, young man who was in no discernable distress. He was alert and oriented with appropriate affect. There was no evidence of thought disorder or psychosis, and no vegetative signs of depression. He denied alcohol or illicit drug use, and there were no clinical signs of organic brain syndrome.

The initial impression was that the patient was experiencing mild to moderate anxiety attacks when repression failed, permitting conflict-laden traumata from his past to become conscious. This view was supported by the fact that these attacks had started at the time when he had lost both parents and was living with foster families.

Dr. Cavenar is chief of psychiatry at the Veterans Administration Hospital, and professor of psychiatry at Duke University School of Medicine, Durham, N.C. 27705.

Dr. Harris is with the Psychiatry Service at NRMC Charleston, S.C. 29408.

A Minnesota Multiphasic Personality Inventory was administered. The results appeared valid, and were suggestive of paranoid schizophrenia. The possibility of a neurotic reaction or organic brain syndrome was also raised. Due primarily to the discrepancy between the clinical evaluation and the test results, neurological consultation was requested.

The neurological evaluation noted a normal physical examination. Skull films were normal, cranial nerves were intact, and motor, power, tone, gait, and coordination were all normal. An electroencephalogram showed brief runs of left temporal four to six Hertz slowing enhanced during hyperventilation. In addition, there were brief, generalized, irregular complex paroxysmal discharges without clinical accompaniment. These findings were considered to be epileptogenic, and the patient was begun on Tegretol 200 mg twice daily. His symptoms totally disappeared on this medication regimen.

Discussion

Intense emotional experiences may occur in temporal lobe seizures. Most common is fear or anxiety.(*2*) This feeling may be accompanied by epigastric distress and a choking, tight feeling in the throat, at times so intense that the patient fears he is dying. These sensations may be accompanied by autonomic phenomena, such as tachycardia, dilated pupils, sweating, and hypotension.(*3*) Fox, et al(*4*) have described such autonomic events responding to anticonvulsant medication even in the absence of clinical evidence of seizure disorder.

Cole and Zangwill(*5*) have noted that the classic feeling of deja vu that may be experienced during temporal lobe seizures is often indescribable by the patient. The feeling is most often a sense of familiarity, of the event having happened previously. This feeling may be associated with auditory or visual hallucinations; at times the patient cannot recall what the memory was, and knows it only as something familiar. Most commonly, the same sequence of events or memories is repeated in each seizure discharge.

Daly(*6*) states that olfactory and gustatory hallucinations are frequent in temporal lobe seizures, but are not always present. The hallucinations characteristically are unpleasant sensations such as burning onions, burnt rubber, or equally noxious stimuli.

Currie, et al(*7*) reported on 666 patients who had clinical features of temporal lobe seizures. The EEG was definitely abnormal in 92 percent of the patients. Of their cases, the temporal lobe seizures began under the age of 10 in 12 percent, between 10 and 15 in 14 percent, between 15 and 25 in 23 percent, between 25 and 45 in 32 percent, and over 45 years of age in 19 percent.

Feindel and Penfield(*8*) state that 75 percent of patients with temporal lobe seizures will have periods of automatic behavior either during or following the seizure. Simple automatisms may include lip-smacking, chewing, or motions of the hands, while complex automatisms such as undressing, wondering about, or running are less commonly seen. Knox(*9*) notes that automations are brief, lasting less than five minutes in 80 percent of cases.

Clearly, if a patient presents with many of the above noted typical symptoms, and is a relatively good historian, the diagnosis of temporal lobe seizures poses little problem. When the symptoms are less well defined, as in this case, it may be extremely difficult to make the correct diagnosis. Given the multiple manifestations and the various clinical presentations of anxiety, one can only wonder how many patients, particularly those who are poor historians, are diagnosed as suffering from anxiety when in fact they are experiencing partial seizures. In this case, it was only an incongruity in findings which led to a neurological evaluation and proper diagnosis and treatment. We suggest that the clinician should consider the possibility of partial seizures in any patient who presents with "anxiety" which in any way appears to be atypical.

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How I Manage the Patient With Urethral Discharge

CDR Gordon R. MacDonald, Jr., MC, USNR

Urethral discharge is a frequent complaint in military and civilian clinics. I have observed that it often presents a diagnostic and therapeutic dilemma for the physician and, not infrequently, is treated inappropriately. This potentially results in increased morbidity and unnecessary concern to the patient.

There are three main causes of urethral discharge. The first is gonococcal urethritis. This usually presents as a thick, often copious, purulent discharge which occurs throughout the day, and frequently stains the underwear. The discharge may even have a greenish color. There is often a history of sexual contact, and associated dysuria and pyuria. A urine culture for standard pathogens will be negative; however, a urethral culture and smear will be positive for gonorrhea.

The second cause for urethral discharge is "nonspecific" urethritis. As the name implies this is urethritis caused by organisms "other than gonorrhea." Recent work has shown that Chlamydia or Mycoplasma may be isolated in approximately 50 percent of these cases, (*1,2*) although a causative role has not been definitely established. The standard clinical bacteriology laboratory does not have the capability to detect these organisms at present and, therefore, the urine culture, urethral culture, and gram stain will be negative or disclose contaminants. The discharge usually is less copious, and less purulent than that associated with gonorrhea. There may be dysuria and pyuria but these also are less intense than with gonorrhea.

The third cause of urethral discharge may be the most common and yet the most confusing condition seen. The patient notes a drop or two of a thin, watery, mucoid discharge, seen usually in the morning on first arising or during a bowel movement. It may appear with sexual stimulation or the patient may volunteer that it appears only if he "milks" his urethra. There may be no history of recent sexual contact and the patient may have had previous courses of antibiotics only to have the problem recur. The discharge is scanty, rarely causing significant staining of underwear. The urinalysis, urine culture, urethral swab culture, and smear are all negative. There may be a history of sexual abstinence or of recent increased sexual activity. The patient may also complain of vague perineal or testicular aching.

This syndrome is due to the normal release of secretions of the accessory sexual glands of which the prostate is the most important. If the patient has been "milking" his urethra, this irritation alone will produce a watery discharge given enough time. Military men are likely to develop these complaints during a tour that separates them from their spouse or shortly after return from such a tour when sexual activity may be increased. The best name for this condition is the Prostatic Congestion Syndrome or Prostatosis. The diagnosis of chronic prostatitis is inappropriate for this condition as it implies an infectious cause and need for antibiotics. I reserve the term chronic prostatitis for chronic bacterial infection of the prostate. I admit that chronic prostatitis may also cause a discharge, but its character is not thin and watery, there is usually associated pyuria and the

From NRMC Charleston, S.C. 29408.

Etiologic Condition	Type of Discharge	Gm. Stain	Urethral Culture	History of Sexual Contact	Management	Pyuria
Gonococcal Urethritis	Thick Purulent, Profuse	Gm. Neg. Intracellular Diplococci	+ for N. Gonorrhea	Frequent	Penicillin + Probenicid or Tetracycline	Present
Nonspecific Urethritis	Variable	WBC's	Usual Cultures Negative	Frequent	Tetracycline	Present
Prostatic Congestion Syndrome	Thin, watery, mucoid, usually in a.m. Patient may have to milk urethra in order to demonstrate or note at bowel movement.	WBC's	Negative	May be absent	Antibiotics not helpful—explanation and reassurance	Usually absent

urine culture is frequently positive for a usual urinary pathogen. There also may be a history of recurrent urinary tract infection some of which may have been accompanied by fever (acute prostatitis).

Trichomoniasis and urethral stricture should be mentioned as rare causes of urethral discharge. The former is diagnosed by a wet prep smear of the discharge or by seeing the organism on the urine. Stricture should be suspected if there is a history of a weak stream, straining to void, and hematuria or pyuria. The discharge with either condition is rarely profuse.

Treatment

The treatment for gonococcal urethritis is as indicated by the Communicable Disease Center and includes either penicillin and probenicid in combination, spectinomycin, or tetracycline.

Tetracycline is probably the best for "nonspecific" urethritis as Chlamydia are usually susceptible to this antibiotic. (*3*)

I do not feel antibiotics are the value in the prostatic congestion syndrome. I advise the patient of the factors responsible for the discharge and suggest that when he resumes sexual activity with regular frequency his discharge will disappear. I find it also important to emphasize that this is not a contageous disease and that he not fear passing it on. I remind him that the symptoms may return if those factors which acted initially to produce the discharge should recur.

Occasionally, I am able to eliminate gonorrhea, Trichomonas, and stricture as causative in a particular case, but remain uncertain whether the patient has prostatic congestion or nonspecific urethritis. In this circumstance, I give a therapeutic trail of tetracycline. The discharge of nonspecific urethritis will respond, prostatic congestion will not.

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Recent Publications by Navy Authors

The following are papers published or issued by Naval Medical Research Institute military and civilian investigators at NNMC Bethesda, Md., since the beginning of 1979.

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Reverse-Phase High-Pressure Liquid Chromatography of Urinary Catecholamine and Related Acidic Metabolites in Biological/Biomedical Applications of Liquid Chromatography by Mell LD Jr. New York, Marcel Dekker pp 619-639, 1979.

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NOTES & ANNOUNCEMENTS

UNIVERSITY OF CALIFORNIA COURSES

The Department of Extended Programs in Medical Education at the University of California School of Medicine will sponsor the following courses:

Neuroradiology 18-20 Oct 1979

This postgraduate seminar will be held at the Fairmont Hotel, San Francisco, Calif. The program has been approved for Category I credit.

Vascular Disorders and the Primary Care Physician 19-20 Oct 1979

A clinically oriented course for primary care physicians in the diagnosis and management of vascular insufficiency disorders. Informal brief lectures will be supplemented by presentation and discussion of illustrative cases. The main objective is the development of *clinical perspectives* to allow the primary care physician to make appropriate diagnostic and therapeutic decisions. The limitations as well as the potential benefits of surgical intervention will be discussed.

This continuing medical education program meets the criteria for 11½ hours in Category I of the Physicians' Recognition Award of the American Medical Association and the Certification Program of the California Medical Association. Family Practice credit has been applied for.

World of Family Therapy Symposium 9-11 Nov 1979

In the past decade, family therapy has grown to become a major treatment modality throughout the world. In this course, the World of Family Therapy will explore the implications of this approach with diverse national and international populations. A distinguished interdisciplinary faculty of psychologists, psychiatrists, and social workers will review recent advances in the field, demonstrate their approaches with live or videotape interviews, and provide attendees with an opportunity to interact with symposium presenters. The course will be of interest to mental health professionals experienced in family therapy, as well as those interested in exploring it as a treatment modality.

The program meets the criteria for 10 credit hours in Category I of the Physicians' Recognition Award of the American Medical Association and the Certification Program of the California Medical Association. The symposium is also approved by the California Board of Registered Nursing for 10 contact hours.

Liquid Chromatography in Clinical Analysis 12-14 Nov 1979

Liquid chromatography is widely used for the monitoring of various classes of therapeutic agents in clinical laboratories around the world. This technique is rapidly replacing older methods. In addition to its usefulness in the areas of pharmacokinetics and toxicology, liquid chromatography is currently being developed for the routine analysis of steroids, catecholamines, bilirubins, and a number of other endogenous constituents. The main objective of this course will be to acquaint clinical pathologists, laboratory directors, clinical chemists, and laboratory supervisors with the concepts of liquid chromatography and its application to patient care. The course will explore current developments in liquid chromatography in detail, and will address the future potential of this technique.

The course is accredited for 19 hours of Category I AMA/CMA credit. Approval of the course for pharmacists and medical technologists is pending.

For more information on the above courses, write or call: Extended Programs in Medical Education, University of California, Room 569-U, Third and Parnassus Ave., San Francisco, Calif. 94143. Telephone (415) 666-4251.

LUNG DISEASE SUPERCOURSE

The Supercourse® V postgraduate program on lung disease sponsored by the American Lung Association of Louisiana, Inc., and its medical section, will be held 27 Nov-1 Dec 1979 at the Hyatt Regency Hotel, New Orleans, La.

The nationally recognized program consists of (1) *16th Annual Pulmonary Function in Health and Disease Course*, (2) *12th Annual Respiratory Disease Course*, and (3) *9th Annual Pediatric Pulmonary Course*. All three programs run concurrently and are accredited by the American Medical Association in Category I for the

Physicians' Recognition Award on an hour-for-hour basis, and by the American Academy of Family Physicians for prescribed hours.

The program content for the three courses covers a broad spectrum of lung disease topics. The pulmonary function course emphasizes pulmonary function testing for the clinician and interpretation of test results, immunology, and patient management. The respiratory disease course is primarily a critical care course for the physician, nurse, and respiratory therapist. Pediatric pulmonary care in the 1980's will be the topic for the pediatric program and will cover subjects of practical use for the pediatrician and family practitioner managing lung disease patients.

Special luncheon seminars will be offered on a limited basis during the program on topics of specific interests and specialities.

The pediatric program will have special sessions for nurses and respiratory therapists that will be tailored to their respective specialities.

Tuition for the program will be $225, and includes a complete coursebook of the faculty's lectures. For additional information, write: John B. Bobear, M.D., Supercourse® V Chairman, American Lung Association of La., Inc., Suite 500, 333 St. Charles Ave., New Orleans, La. 70130.

ATTENTION NAVY AUTHORS

Many articles by Navy personnel appear each year in a variety of professional journals and other publications. *U.S. Navy Medicine* would like to include a monthly list of some of these articles written by Navy authors from all corps. If you have published recently and would like to share your research or perceptions with your colleagues, please send us the title, name, and issue of the publication in which your article appeared.

NEW NURSING PROCEDURES MANUAL

The new Nursing Procedures Manual, NAVMED P-5066, contains many pages of precise step-by-step directions and explanations for patient care procedures currently being taught and used throughout Navy Medical Department facilities. The 1979 edition will be used more extensively than its 1973 counterpart. Not only will the manual appear in hospitals and clinics, but also in Hospital Corps classrooms and at independent duty stations. The new text is intended to reinforce and add to previous formal instruction. In addition to being distributed to all ships and stations having Medical Department personnel, private copies of the new manual should be available for purchase through the Government Printing Office sometime in September.

The old manual will be obsolete when the new one is issued. To save money, keep your old NAVMED P-5066 three-ring binder. It can be kept current by using lacquer thinner, nail polish remover, or acetone to remove "(1973)" and "NURSE CORPS, U.S. NAVY."

When the price of the new manual has been established, we will announce it along with the GPO address for people who want to purchase a private copy.

WITHDRAWAL FROM PART-TIME OUTSERVICE TRAINING

Participants in Navy Medical Department part-time outservice training are reminded that if they enroll but withdraw before completing a course, they are required to immediately notify their commanding officer in writing. The Naval Health Sciences Education and Training Command should be informed of the circumstances causing the withdrawal *including* a statement by the commanding officer concerning determination as to whether this action was or was not due to circumstances beyond the individual's control. Further, a statement is to be included concerning refunds effected or costs to the Government incurred (see BUMEDINST 1500.7D).

SEMINAR ON ASBESTOS ASSOCIATED DISEASES

Navy Medical Department representatives will participate in a seminar on Asbestos Associated Diseases to be held 11-13 Oct 1979 at the Texas Medical Center, Houston, Tex. The seminar meets the criteria for 24 Category I CME credits. The registration fee will be $300 per attendee.

Information may be obtain by writing: The Office of Continuing Education, Baylor College of Medicine, Texas Medical Center, Houston, Tex. 77030.

NAVY RECEPTION AT ACS MEETING

During the American College of Surgeons annual meeting, a Navy reception will be held 24 Oct 1979, from 1800 to 2000, in the Upper Summit Room of the Conrad Hilton Hotel, Chicago. For further information, contact: CAPT Robert R. Abbe, MC, USN, Chief of Surgery, Naval Regional Medical Center, Great Lakes, Ill. 60088. Telephone: Autovon 792-3629, Commercial (312) 688-3629.

MEDICO-LEGAL FEEDBACK—MALPRACTICE PROPHYLAXIS

Based upon the collective experience in defending thousands of medical malpractice claims, the Judge Advocate General recently recommended certain prophylactic measures, which are listed here for consideration.

Keep good medical records. The medical record is the witness in a case since a physician seldom remembers the details of treatment at the time of trial. If a record is incomplete, illegible, or inaccurate, it may lend credence to the patient's claim.

Do not make admissions in the record. One case was lost because a Navy doctor wrote: "Pt. justifiably upset that dx. was missed in the clinic." Notwithstanding expert testimony that care was proper, the words "justifiably upset" led to a $50,000 verdict.

Consult. There is seldom a valid response to the question, "Well, why didn't you consult with the specialist, doctor?"

Maintain good rapport. More than any other single thing, good rapport prevents lawsuits. Many patients with whom good rapport was maintained refrain from filing malpractice claims even though valid grounds exist. Conversely, disgruntled patients file claims even though their care was entirely appropriate.

Keep patients informed. This is a major ingredient in good rapport. For example, a simple explanation for keeping someone waiting may ease the patient's apprehension and tell him in effect, "We haven't forgotten you; you're still important to us." All personnel from HR to senior officer could help prevent claims by recognizing each patient's dignity as a human being and keeping him apprised of his condition and his place in the health care delivery system.

The JAG's recommendations are well founded. It is hoped that they can be stressed continually throughout the Medical Department.

COMPUTER ASSISTED PRACTICE OF CARDIOLOGY (CPOC) CONTRACT AWARDED

On 31 July 1979, the Tri-Service Medical Information System (TRIMIS) CAPOC Contract was awarded to Marquette Electronics, Inc. of Milwaukee, Wis. The contract award culminates many years of effort by TRIMIS, Navy, Army, and Air Force personnel. The contract provides for computer systems, telecommunications, and contractor technical support to satisfy electrocardiogram processing requirements in 15 previously identified CAPOC regions. The first installation will be initiated by 30 Sept 1979, to support NRMC San Diego, Calif., and tri-service medical treatment facilities throughout southern California and Nevada. The regional configuration will consist of the regional control center (computer site) at NRMC San Diego, six additional Navy and Air Force overread centers (display terminal and ECG tracing/report printers), and thirteen additional Navy and Air Force user sites (printers).

DENTAL TECHNICIAN TRAINING SCHEDULE REVISED

Due to a vast improvement in manning throughout the Dental Technician Rating, the Dental Assistant, basic Class "A" School will return to a 12-week schedule. The first class under the new schedule will convene on 9 Oct 1979.

NEHC COMPLETES MOVE & HAS CHANGE OF COMMAND

The Navy Environmental Health Center has completed its move from Cincinnati, Ohio to Norfolk, Va. The Center was fully operational 6 Aug 1979. On 20 July 1979, CAPT John Caruso, Jr. relieved CAPT Thomas N. Markham as the commanding officer. The new address and telephone numbers are: Navy Environmental Health Center, Naval Station, Norfolk, Va. 23511, Autovon: 690-4657, Commercial: (804) 444-4657.

MSC REQUESTS UPDATE OF PREFERENCE CARDS

The Medical Service Corps Division is making a concerted effort within all professional communities for which it is responsible—administrative, scientific, and clinical—to update information on its officers education, professional certification, sub-specialty training and experience, family status, and duty preferences. Such information is essential for career planning and duty assignment considerations. Each Medical Service Corps officer should be responsible for an update of his or her preference card (NAVPERS 1301/1-Rev. 8-72).

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